

REMARKS

I. Introduction

In response to the Office Action dated April 22, 2005, claims 6, 7, 11, 13, 51, 52, 56, 58, and 93 have been cancelled, claims 1-5, 8, 12, 16, 23, 30, 35, 39, 42, 43, 46-50, 57, 61, 68, 75, 76, 80, 84, 87, 88, 91, 92, 94, and 95 have been amended. Claims 1-5, 8-10, 12, 14-50, 53-55, 57, 59-92, 94, and 95 remain in the application. Re-examination and re-consideration of the application, as amended, is requested.

II. Claim Amendments

Applicant's attorney has made amendments to the claims as indicated above. These amendments were made solely for the purpose of clarifying the language of the claims, and were not required for purposes of patentability.

III. The Cited References and the Subject Invention

A. The Boyer Reference

U.S. Patent No. 6,268,849, issued July 31, 2001 to Boyer et al. discloses an internet television program guide system with embedded real-time data. The Internet television program guide system allows a user at a multimedia system to access television program listings containing embedded real-time data over an Internet communications link. The television program listing may be for a sporting event that is currently being broadcast and the real-time data may be the current score of the event, the current weather where the event is taking place, or any other suitable real-time information on the event. The real-time data may be presented in the form of video stills, video clips, textual information, audio clips, or suitable combinations of such media. The user can perform database searches on the program guide listings to search for a desired program. If desired, the user can obtain additional information on a selected program by accessing an associated web page.

B. The Alexander Reference

U.S. Patent No. 6,177,931, issued January 23, 2001 to Alexander et al. discloses systems and methods for displaying and recording control interface with television programs, video, advertising information and program scheduling information. It is said to be an improvement over previous Electronic Programming Guides ("EPG") in that it provides, among other things: Improved viewer

interaction capabilities with the EPG; improved viewer control of video recording of future-scheduled programming; improved features to the EPG display and navigation; parental control of the EPG display; improved television program information access by the viewer; improved opportunities for the commercial advertiser to reach the viewer; improved product information access by the viewer; creation of a viewer's profile; utilization of viewer profile information to customize various aspects of the EPG; and utilization of viewer profile information to provide customized presentation of advertising to the viewer.

C. The Sampsell Reference

U.S. Patent No. 6,219,839, issued April 17, 2001 to Sampsell discloses an on-screen electronic resources guide. The system provides an on-screen electronic resource guide (ERG) includes an audio/visual display device; plural peripheral devices, each having an active mode and an inactive mode; an interface located between said audio/visual device and said peripheral devices; and an ERG generator for providing an ERG display for displaying programming available to said audio/visual display device from said peripheral devices when such devices are in their active mode. A method for providing an on-screen electronic resource guide (ERG) in an audio/visual display device having plural peripheral devices connected thereto over an interface, wherein each peripheral device has an active mode and an inactive mode includes generating an ERG display for displaying programming available to the audio/visual display device from said peripheral devices when such devices are in their active mode, and controlling a peripheral device from the ERG display.

IV. Office Action Prior Art Rejections

A. Rejections Under 35 U.S.C. § 102(e)

On page (2), the Office Action rejected claims 1, 2, 11-16, 23-24, 27-33, 35-40, 46-47, 56-61, 68-69, 71-77, 80-85, and 88 under 35 U.S.C. § 102(e) as being anticipated by Boyer, U.S. Patent No. 6,268,849 (Boyer). The Applicant respectfully traverses these rejections.

With Respect to Claims 1 and 46: Claim 1 recites:

*A method of providing media program information, comprising the steps of:
accepting a command to select an active channel from a plurality of selectable channels;
accepting a command to provide a menu guide selected from a plurality of menu guides together
defining a media program information space segmented by daypart, wherein the menu guide is associated with
a first daypart; and*

providing the menu guide, the menu guide comprising a menu guide content portion presenting media program information regarding media programs consisting of all of the media programs scheduled to be available during the first daypart on the active channel.

Claim 1 has been amended to more specifically recite that the menu guide comprises a menu guide content portion presenting media program information regarding media programs consisting of all of the media programs scheduled to be available during the first daypart on the active channel. In other words, the menu guide presents all of the media programs scheduled to be available on the active channel for the daypart, but does not present media program information regarding media programs outside of the first daypart or media programs scheduled to be available on channels other than the active channel. In doing so, the Applicant's invention prevents the right amount of information to the viewer in the proper context and in a way that is easily navigable. As described in the Applicant's specification:

Typically, electronic program guides are based around the use of a scheduling grid. This grid typically involves one axis that corresponds to time and another axis that corresponds to transmission channels. At the intersection of each channel and time slot is a "cell" which typically displays the title of the program that is being shown on that channel at that time.

The number of media programs available to the consumer has been increasing dramatically. As a result, on screen guide information density is increasing exponentially as well. Due largely to resolution limitations, conventional scheduling grids are ill suited to present the increased number of available media programs to the user in a meaningful way. For example, as a general rule, any information provided in a program guide should be legible when presented on a 19 inch NTSC television with 250 scan lines of resolution at a distance of 15 feet. This substantially limits the amount of information that can be presented at one time. Such limitations are especially problematic for scheduling grids, because the grids present information the viewer is not interested in (channels time slots that are not of interest), and not enough information about what the viewer is interested in (more detailed information about future broadcasts on the current channel or other channels).

Current grid guides, especially those that incorporate a PIG or "picture in guide" suffer as channel capacity and therefore information density increases. Reduced screen real estate brought on by the video window results in limited viewable time line (1.5 hrs ahead is typical), limited channel display area, limited space for program descriptions, limited overall legibility and cumbersome navigation. All of these factors negatively impact the real world usefulness of a grid guide.

When taken on whole, a "snap shot" of the most sophisticated grid guide exhibits a remarkable lack of useful information. In many cases, program titles in the grid are reduced to single words making them unidentifiable unless highlighted. System latencies slow the highlighting process. Program descriptions are displayed one at a time. Incorporating advertising, whether in the grid or blocked along side will impact the information capacity even further.

Also, if a user wishes to determine what programs will be available on a particular channel two hours in the future, the user must typically scroll through a number of screens to obtain this information. Then, after the user has done so, the information presented by the scheduling grid is minimal at best, and shared with other programs that are not of interest (i.e. those broadcast on other channels).

One way of overcoming the space limitations is to reduce guide fonts. However, this increases visual clutter and decreases legibility. Cumberseome and complex graphic "animations" must be employed to display second level information in the limited screen real estate. Current attempts to overcome these limitations try to cram ever more complex information display metaphors into less space with the result being *more equalling less*.

U.S. Patent 6,075,575, issued to Schein et al. on June 13, 2000, for example, shows a typical grid-based program guide. While the program guide permits the user to view a wide range of information, it still suffers the same limitations as the grid guides of old in that it presents information that the user is not interested in

and does not present information that the user is likely to be interested in. The resulting waste of display real estate requires the user to pass through a maze of complicated commands with far more user inputs than is really necessary.

What is needed is a user interface that displays information in a way that presents information the user is interested in, and which does not waste screen space presenting information of no interest. What is also needed is a new information and navigation paradigm that streamlines the accessing, manipulating, and sorting of guide data related to broadcast, stored and streamed video and interactive service offerings. (Specification, page 1, line 27 - page 3, line 17)

This is accomplished by presenting media information according to a context that takes viewer habits and proclivities into account. In one embodiment, the invention makes use of broadcasting "daypart" or general time of day programming category as the broad filtering mechanism to organize guide and video information. The "daypart" paradigm is particularly useful in situations where viewers tend to watch television at the same time each day. For instance, a viewer who works during the day tends to watch television at night during prime time. Programming providers and advertisers tend to target their limited resources in both available airtime and media dollars in order to target that viewer effectively.

The paradigm organizes the available and pertinent program guide information according to convenient categories such as dayparts, and targets or parses it in a similar fashion. It focuses the vast pool of data that makes up the on air guide by imposing filtering that is based on the current daypart the viewer is residing in. It gives the user only the data they need exactly when they need it. (Specification, page 3, line 24 - page 4, line 7)

The present invention has numerous advantages over grid or spreadsheet-based on-screen programming guides and their variations.

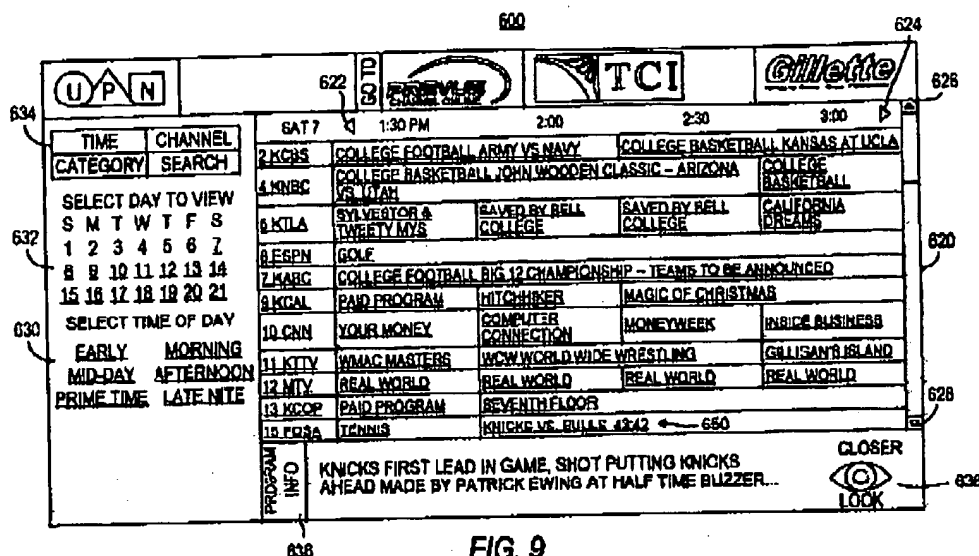
First, the invention separates guide data and multimedia content into multi-dimensional "information planes" that configure their internal content relative to the channel space and time placement perspective of the viewer/user. These planes can, as in this example, contain programming information configured in daypart context for the viewer. That is, by default, the viewer is first presented with programming information filtered by the current time period of the broadcast day or "daypart". This initial contextualization of the information bases the ensuing navigation path and parsing of guide information directly on the fundamental viewing habits of individual users.

It allows viewers to find, manage and access linear and non-linear (transmitted, streamed or stored) programming from a single unified interface. That is, all available video media and interactive assets on the service or stored in the IRD are brought into one seamless content manager. This integrates broadcast content with personal video recorder (PVR)-based video content, interactive services, enhanced broadcast layers and other technologies. The result is a program guide that is seamless, fully integrated and, most importantly, intuitive, and user friendly. These user interfaces carry channel information, branding information, advertising, programming specific information, scheduling, and include a control interface for PVR functionality.

The present invention allows more useful program information to be displayed at any given time. Channels surfed within the menu guide metaphor display full titles and abbreviated content descriptions five or six programs at a time going forward up to six hours or one full daypart. This is accomplished without scrolling or the need to highlight or cursor over each individual title as in current grids in order to see a single, abbreviated program description. By contrast, grid or spreadsheet guides display channels five or six at a time with ONE highlighted description visible. This is typically across a time line of only 1.5 hours. Individual titles are often abbreviated within these grids to the point of being unidentifiable requiring the user to highlight the item.

Channel menu guide lineups for each daypart can be displayed as fast as the channel selector can be scrolled. That is, at every screen refresh, the menu guide displays five or six titles with descriptions at a time. Therefore, more programming selections can be viewed in the same given time spent using the guide function. (Specification, page 5, line 1 - page 6, line 2)

We now compare the claimed features of claim 1 with the cited references. FIG. 9 of the Boyer reference is reproduced as follows.



With regard to FIG. 9, Boyer states:

The user may also navigate the program listings with time navigation buttons 630. For example, if the user would like to view program listings that begin in the morning, the user clicks on the morning navigation button 630. (col. 9, lines 32-36)

This simply discloses a shortcut that the user may use to skip the program grid to begin at a particular time that is designated "morning." It does not disclose presenting all of the media programs scheduled to be transmitted by a selected active channel for the entire daypart (FIG. 9 shows that the grid presents information going only 2 hours in the future, and 2 hours does not appear to be sufficient to cover the entire portion of any of the time periods listed). Further, it does not make sense to interpret Boyer as disclosing resizing the grid to cover an entirety of one of the periods shown, because (a) Boyer doesn't disclose a grid with different temporal dimensions in any context and (2) if this were done, each of the entries shown in FIG. 9 would be substantially reduced in size to the point of unreadability.

FIG. 9 also fails to disclose the notion of an active channel, and does not limit the program information to only that which is scheduled to be available on the active channel ... program information for multiple channels is presented.

FIG. 12 discloses an interface that limits the presentation to a single channel, but it does not limit the presentation to media programs scheduled to be available only during the daypart. As

shown below, the media program information shown in FIG. 12 clearly substantially exceeds that of a single daypart.

800

806

807

802

804

FIG. 12

Therefore, even when combined, Boyer and the remaining references of record do not fairly teach the features recited in claim 1 ... in fact, they teach away from these features. Program guides are a crowded art ... but even so, the Applicant's daypart-based display and navigation scheme is unique in that it displays information in a way that presents information the user is interested in, while not wasting screen space presenting information of no interest, and also streamlines the accessing, manipulating, and sorting of guide data related to broadcast, stored and streamed video and interactive service offerings.

Claim 46 recites similar features and are patentable for the same reasons.

With Respect to Dependent Claims 2, 12, 14-16, 23-24, 27-33, 35-40, 47, 57, 59-61, 68-69, 71-77, 80-85, and 88: Dependent claims 2, 12, 14-16, 23-24, 27-33, and 35-40 depend on claim 1 and dependent claims 47, 57, 59-61, 68-69, 71-77, 80-85, and 88 depend on claim 46 and are patentable for the same reasons. These claims also include other features rendering them patentable over the Boyer reference.

B. Rejections Under 35 U.S.C. § 103(a)

In paragraph (2), the Office Action rejected claims 33-34, 41-43, 78-79, and 86-87 were rejected under 35 U.S.C. §103(a) as being unpatentable over Boyer. In paragraph (3), the Office Action rejected claims 3-10, 17-22, 25, 48-55, 62-67, and 70 were rejected under 35 U.S.C. §103(a) as being unpatentable over Boyer in view of Alexander, U.S. Patent No. 6,177,931 (Alexander). In paragraph (4), the Office Action rejected claims 44-45 and 89-90 under 35 U.S.C. §103(a) as being unpatentable over Boyer in view of Sampsell, U.S. Patent No. 6,219,839 (Sampsell). Applicant respectfully traverses these rejections.

The Applicant disagrees with the notion that it would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the references as described in the Office Action. In the context of media program guides, it is tempting to argue that it is a simple and obvious matter to add features that are present in one program guide to another. Ergonomic factors and limited space on displays with limited resolution demand judicious choice of what information be provided in what context and how that information is presented. Boyer, for example, is directed to an Internet television programming guide, which typically allows navigation by a mouse-driven cursor and much higher resolution than does a typical television set. Factors that drive the ergonomics of this design are substantially different than those that would drive program guides that are displayed by a television.

By way of example, claims 33 and 34 recite that the menu guide includes a menu content portion navigation icon indicating when the menu content portion of the menu guide is activated for navigation. The Office Action acknowledges that this feature is not disclosed in Boyer, but indicates that this feature is well known in the art, citing an example relevant to an Internet browser. However, the purpose of the navigation icon is to indicate to the user that they have activated navigation of the menu guide. This feature is beneficial because it provides a shortcut that allows the user to use the limited functionality of the remote control quickly and easily (no need to navigate with the up-down left-right buttons all across the display ... just to select portions of the screen for navigation and navigate through them), and confirms entries made. Internet browsers use mouse driven pointers that can be used to quickly select any part of the screen desired, and automatically provide an indication of what portion of the screen is being navigated, by virtue of the mouse icon. In the context of a remote control without this functionality, an Internet browser would teach tabbing across the entire page until the desired active area was reached. This in fact teaches away from the Applicant's invention.

In any case, the foregoing claims each recite the features of the claims they depend upon, and are patentable for the reasons described above.

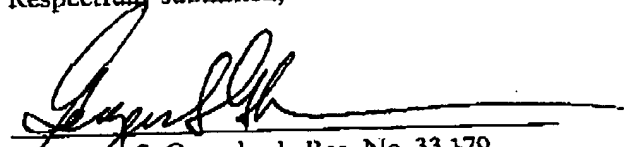
V. Claims Not Considered

The Office Action does not address the patentability of claims 91-95. The Applicant respectfully requests the Examination of these claims.

VI. Conclusion

In view of the above, it is submitted that this application is now in good order for allowance and such allowance is respectfully solicited. Should the Examiner believe minor matters still remain that can be resolved in a telephone interview, the Examiner is urged to call Applicant's undersigned attorney.

Respectfully submitted,


Georgann S. Grunebach, Reg. No. 33,179
Attorney for Applicant

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The DIRECTV Group, Inc.
RE / R11/ A109
P.O. Box 956
2250 E. Imperial Highway
El Segundo, CA 90245-0956

Phone: (310) 964-4615